



Intelligence and Electronic Warfare Tactical Proficiency Trainer (IEWTPT)







Purpose

To provide an overview of the Intelligence and Electronic Warfare Tactical Proficiency Trainer (IEWTPT) program.





Outline

- > IEWTPT Description
- > Features
- > IEWTPT Design
 - TSA

Constructive Simulation

• TCC

- Instrumentation Interface
- > Modes of Training
- Distributive Training
- > Support Concept
- > Summary



IEWTPT – What is it?



- Integrates low-density, high demand Army ISR systems into constructive simulation
- Directly supports Joint and OSD transformation
- Unique program 8 other PM's engaged (PM Prophet, PM UAV, PM TENCAP, PM CGS/DCGS-A, PM ACS, PM CHIMS, PM Signals Warfare)



IEWTPT – What does it provide to the Army?



- Trained commanders and battle staffs in the use of ISR for OF
- Properly trained ISR-centric force
- Joint Context: Maximize ability for the Army to affect the future of Joint ISR



IEWTPT Description



MISSION

Provides a battlefield awareness tool to train maneuver commanders, battle staffs, Military Intelligence (MI) soldiers, crews, and units to exercise their the full set of intelligence capabilities.

CHARACTERISTICS/DESCRIPTION

- Three functional grouping of capabilities
 - Target Signature Array (TSA) embedded or attached into the IEW Tactical equipment.
 - Technical Control Cell(TCC) which networks the TSAs / collects afteraction data.
 - Supporting constructive simulations
 - IOC: TACSIM/JCATS/CBS
 - FOC: JSIMS/WARSIM/JTIM

CAPABILITY / IMPROVEMENTS

- Supports collaborative training across the Military Intelligence disciplines
- Provides individual, team & collective Battlestaff training
- 3 training modes: Integrated, Playback & Standalone

CONTRACTING

Contract Type: CPIF / FFP Award Date: 28 Nov 00

BOIP: 8 Sites

Contractor: General Dynamics, Inc.

(Formally Motorola Inc.)

Sub-Contractors: CACI, DME, TITAN

IEWTPT PROGRAM IS UNIQUE

- Training Mission Area (TMA) Funding:
 - TCC development, testing & fielding
 - TCC interface to constructive simulation
 - TCC Interface to TSAs
- Tactical System PMs:
 - Funding TSAs
 - TSA development testing & fielding

Accomplishing tomorrows training requirements today. =



Features





- Realistic Training for the Warfighting Commander and the Battle Staff
- Exercises the Intelligence Battlefield Operating System (I-BOS)



• Provides an environment SIGINT Sensor Model for the Commander, G-3, G-2, Intelligence Collection Manager and Intelligence system operators to rehearse their critical Intelligence, Surveillance, and Reconnaissance (ISR) tasks.

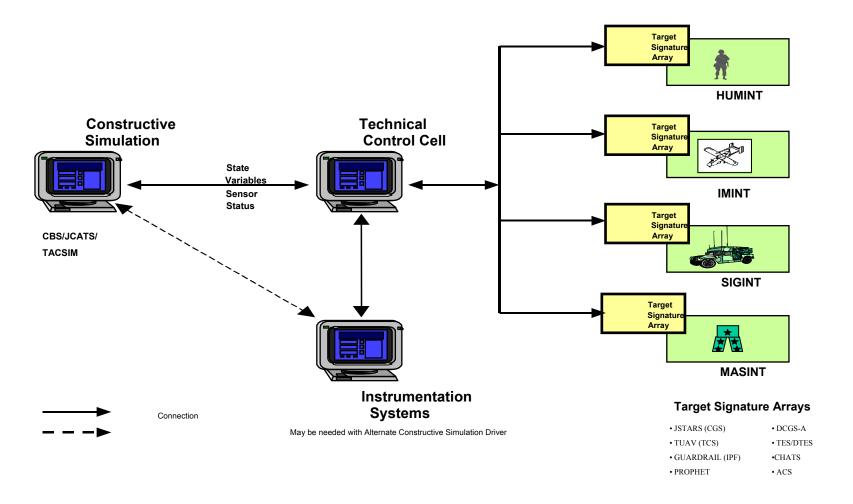








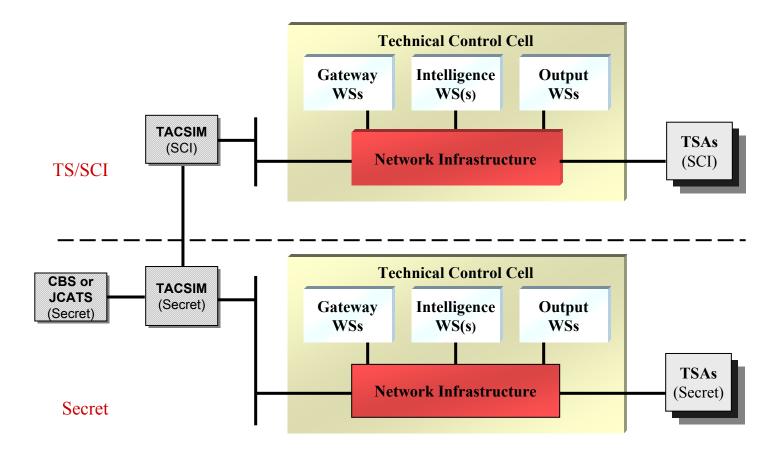
IEWTPT Concept





IEWTPT TCC Design







General Dynamic's Design Concept



- Build/Install Technical Control Cell
- > TCC interfaces
 - Constructive Simulation (simulated players)
 - **JSTARS CGS** DCGS-A **Instrumentation System (live players)** DCGS-**IEW Systems (collection systems operators)** S **TECHNICAL CONTROL CELL TUAV TCS GRCS AAR** Gateway Models COMMS I/0 TSA INTERFACE TES/DTES CHATS Constructive Instrumentation Simulation **System** CBS/JCATS/ NTC, JRTC **TACSIM PROPHET**



Training Modes



Integrated, Playback & Standalone

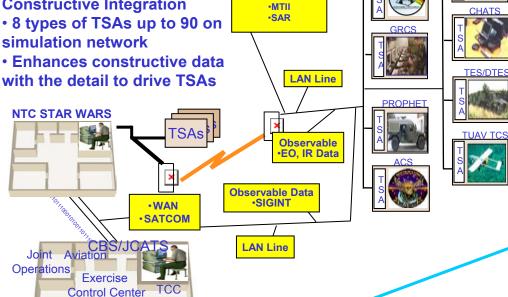
Integrated

WFX Model

Maneuver

Logistics

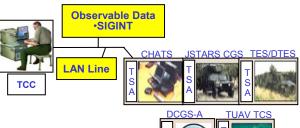
- Capable of Live and **Constructive Integration**
- simulation network
- Enhances constructive data



Observable Data

Playback

- Intel specific training
- TCC Records simulation scenario for playback
- Sufficient data to re-task ISR assets, maneuver scenario can't change
- Train ISR operators and MI battlestaff







Standalone

- Intel operator specific training
- TSA Records data for playback



Artillery

SIM Center













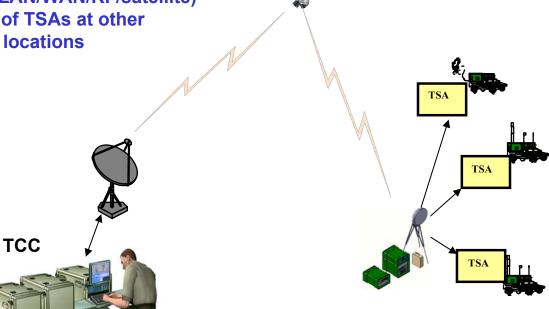






Distributive Training

➤ TCC can port it's scenarios over various communication links (LAN/WAN/RF/satellite) to provide stimulation of TSAs at other geographical distance locations



This capability will allow the eight fielded TCCs to drive the integrated/playback mode of training to other installations (e.g. Fort Carson, Fort Drum, Fort Riley, etc.)





Support Concept

- > On site training
 - NET and DTT
- > On site CLS for TCC
 - Operators and maintenance
- > TTP for how to use
- > WEB site for online support and questions
- > Integrated into USAIC&FH training



Summary



- ➤ Invest in a new direction and achieve system commonality
- ➤ Integrate with instrumentation systems
- > Full spectrum of training with same systems at institution, homestation, CTCs, and while deployed (Institution, Operational & Self-Development
- > Embed trainers in systems
- Increase intel realism and fog of war
- > Put MI soldiers in the training loop at homestation and CTC's
- > Provide training capabilities that incorporate individual, crew, and battlestaff
- > Leverage distance training/learning and distributive technologies
- Provide individual and collective evaluation of training and AAR
- ➤ Integrate future systems as we migrate to OF, DCGS-A/FCS
- > Framework for integrated and holistic embedded training, testing, and requirements determination